



Specifications for SWC #182 Elevator Maintenance

1) Purpose

The purpose of this contract is to ensure the maintenance and repair of elevators, escalators, dumbwaiters, and wheelchair lifts for the State of Tennessee and other Authorized Users. The intent of this contract is that the Contractor provides full equipment maintenance and service.

2) Scope

1. The purpose of this contract is to ensure the maintenance and repair of elevators, escalators, dumbwaiters, and wheelchair lifts for the State of Tennessee and other Authorized Users. The intent of this contract is that the Contractor provides full equipment maintenance and service. Under this contract the Contractor shall provide:
 - i) Full maintenance and repair services in accordance with requirements of the State of Tennessee and the following American Society of Mechanical Engineers (ASME) Handbooks, as updated;
 - (1) The Elevator Safety Code. The Safety Code for Elevators and Escalators, ASME A17.1 - 2010/CSA B44-10, Nineteenth Edition
 - (2) ASME A17.6 - 2010
 - (3) The Safety Code for Existing Elevators and Escalators. ASME A17.3 - 1996, Fourth Edition
 - (4) CSA B44.1/ASME A Elevator and Escalator Electrical Equipment
 - (5) Compliance with applicable city codes
 - ii) 24 hours/day, 7 days/week emergency response service;
 - iii) Same day service in response to an elevator malfunction;
 - iv) After-hours callback service; and
 - v) Safety inspection and test teams for routine safety certification in accordance with ASME and the standards and regulations of the State of Tennessee.
2. Below is a list of potential machinery types found in State and Authorized User buildings. It is not an exhaustive list of all machines the Contractor shall be required to service. The State may add or remove machinery types from this list during the Contract.
 - i) Hydraulic Elevator
 - ii) Gearless Traction Elevator
 - iii) Geared Traction Elevator
 - iv) Wheelchair Lift
 - v) Escalator
 - vi) Dumbwaiter

3. Jobs that are estimated to be over one hundred thousand dollars (\$100,000) are excluded from being conducted under this contract without the prior approval of the State Building Commission (“SBC”) per By-Laws, Policy, and Procedure of the State Building Commission of Tennessee Item 2. Agencies should maintain SBC approval documentation for a minimum of five years following the end of the contract period for audit purposes of all contract release orders that are valued at one-hundred thousand dollars (\$100,000) or more. Agencies should contact the Contract Administrator to determine proper approval procedures.
4. Contractor shall accept all equipment “as is” at contract award and shall maintain and repair equipment to meet current equipment codes (Tenn. Code Ann. § 68-121-101 et seq and Tenn. Comp .R. & Regs. 0800-03-04-01). Any elevator equipment not in compliance shall be brought into full compliance with this contract for the duration of the contract.
5. Services outside the scope of Monthly Maintenance and Repair are as follows;
 - i) Replacement of discontinued parts
 - ii) Modernization or Renovation of machinery
6. It is the Contractor’s responsibility to gain any necessary access to perform the required maintenance. This includes access to proprietary and non-proprietary equipment.

3) Definitions

1. Authorized Users:
 - i) All Tennessee State governmental entities (this includes the legislative branch; judicial branch; and, commissions and boards of the State outside of the executive branch of government);
 - ii) Tennessee local governmental agencies;
 - iii) Members of the University of Tennessee or Tennessee Board of Regents systems;
 - iv) Any private nonprofit institution of higher education chartered in Tennessee; and,
 - v) Any corporation which is exempted from taxation under 26 U.S.C. Section 501(c) (3), as amended, and which contracts with the Department of Mental Health and Substance Abuse to provide services to the public (Tenn. Code Ann. § 33-2-1001).
2. Monthly Maintenance: A monthly process of routine examination, lubrication, cleaning, and adjustment of parts, components, and subsystems for the purpose of ensuring performance in accordance with ASME A17.1-2010. Monthly Maintenance is included in the monthly cost between the State and the Contactor(s), reference Attachment B.
3. Preventative Maintenance: Examination, lubrication, painting, and adjustment of parts, components, or subsystems at intervals recommended by the equipment manufacturer and ASME codes or as dictated by the use of the equipment or Authorized User. Preventative Maintenance is included in the monthly cost between the State and the Contactor(s).
4. Inspections and Tests: As defined in sections 8.10 and 8.11 in the ASME A17.1-2010. Inspections and Tests are included in the monthly cost between the State and the Contactor(s).
5. Additional Repairs and Modernization: Service conducted outside Maintenance, Inspection, and Testing. Remodeling and updating requested by Authorized Users with permission from the State Building Commission.
6. Regular Work Hours: Monday through Friday 8:00 AM – 4:30 PM, excluding legal State holidays. A listing of State holidays can be found at <https://www.tn.gov/about-tn/state-holidays.html>. Any work conducted outside of Regular Work Hours must have prior written approval from an Authorized User.

7. Suspended: Unit is temporarily out of service. Suspended units still require maintenance.
8. Dormant: Unit was removed or parts were removed so that the unit cannot operate again. These units do not require maintenance.
9. Red-tagged: These units are to be considered out of service unless stated otherwise by the Authorized User's facility manager. If a unit is red-tagged, no maintenance is needed, but the unit will still need category testing.
10. Renovation: Renovation refers to any purely cosmetic or aesthetic changes. Renovation does not refer to any repairs affecting the function of the unit.
11. Modernization: Modernization refers to any upgrades made to fully functioning units. Modernization does not refer to any repairs.

4) Materials and Services

1. Monthly Maintenance:

- i) Contractor shall provide elevator maintenance services every month, to include all labor, equipment, and materials as outlined in these specifications. General categories of equipment maintenance shall include, but are not limited to, the following as specified in the most recent revision of the ASME:
 - (1) Proper cleaning of elevator cars, car tops, pits, machine rooms, and machines;
 - (2) Lubrication of guides, rails, suspension means, safety linkages, and machines;
 - (3) Adjustment of doors to ensure full closure at a correct speed and proper operation of the door reopening devices;
 - (4) Inspection of buttons, key switches, lights, indicator lamps, and audible indicators;
 - (5) Testing of elevator controls system(s), acceleration and stopping capabilities, safety circuits, fire safety features, and electronics;
 - (6) Review of the machine's mechanical condition, adjusting or replacing gears, brakes, bearing, or ropes when needed.
- ii) The State of Tennessee adheres to the most recent revision of the ASME as a standard for all hoisting and lowering mechanisms and power-driven stairways and walkways. The Contractor shall ensure compliance with all ASME standards and requirements as well as all State regulations.
- iii) Out of service or dormant service elevators may be included in monthly maintenance service at the discretion of the Authorized Users.
- iv) Contractor shall provide dumbwaiter maintenance services every month, to include all labor, equipment, and materials as outlined in these specifications. Dumbwaiter equipment maintenance shall include, but is not limited to, categories specified in the most recent revision of the ASME Safety Code.

2. Preventative Maintenance

- i) **Paint**: Contractor shall paint the equipment at frequencies sufficient to maintain a professional appearance, prevent rusting, and preserve the equipment. All paint shall be suitable for the purpose intended and of high quality. Application of the paint, in all circumstances, shall comply with current ASME codes and shall be in colors approved by the Authorized User's facility manager. Any exceptions are done at the discretion of the facility manager.
- ii) **Lubrication**: Contractor shall, at a minimum, lubricate the equipment at the frequency recommended by the manufacturer and ASME, or more frequently if dictated by use of the

equipment. All lubricants shall be suitable for the purpose intended and shall meet or exceed the minimum requirements specified by the manufacturer of the equipment to which the lubricant is applied. Lubricants, cleaning fluids, and all combustible liquids shall be stored in a metal cabinet in the machine room.

- iii) Adjustments: Contractor shall adjust the equipment as necessary and when the operation of the equipment varies from its normal or originally designed performance as a result of normal wear and tear; or when necessary to preserve the useful life of a part or assembly; or when necessary to continue safe, dependable operation in accordance with ASME codes; or to continue performance of the equipment in accordance with original design, including smoothness and quietness of operation. As adjustment changes are required due to code and/or ADA changes, these shall be made by the Contractor at no additional cost to the Authorized User, except where hardware or wiring changes are required.
 - iv) Obsolescence: If a single part is not available, a closely compatible component shall be substituted, upon prior approval by the Authorized User. Discontinued parts are not included in the monthly maintenance. Discontinued parts are to be paid on a “cost-plus” basis, as per Terms and Conditions 7.3.
 - v) The Contractor shall have available at all times for immediate use a complete set of pertinent elevator maintenance and repair tools and instruments. The intent and purpose of this requirement is for the Contractor to be able to complete all required service as needed.
3. Response Time
- i) Callback service during Regular Work Hours: Twenty-four (24) hour callback onsite service shall be provided by the Contractor without additional charge, either for labor or for travel time and expense. The Contractor shall respond to any callback within a maximum of two (2) hours from the time the request for service is made by the Authorized User’s facility manager.
 - ii) Emergency callback service: two (2) hour emergency callback onsite service shall be provided by the Contractor at no cost, regular or after-hour rates as appropriate, for an emergency situation. Emergencies are defined by the Authorized User’s facility manager.
 - iii) Callback service outside of Regular Work Hours: Twenty-four (24) hour emergency callback onsite service shall be provided by the Contractor at an additional charge for hours outside of Regular Work Hours. The additional charge will be in the form of an established hourly rate. The Contractor shall respond to any callback by email or phone within a maximum of two (2) hours from the time the request for service is made by the Authorized User’s personnel.
 - iv) The Contractor shall provide, at no extra cost, a 24 hours/day, 7 days/week, 52 weeks/year coverage for emergency trouble calls. A trained mechanic shall be “on call” and shall be on site within one (1) hour of the placement of an emergency trouble call. Emergency situations include people trapped in an elevator car, the suspicion/confirmation of a fire in or around the elevator equipment, or an inoperative elevator with no suitable backup.
 - v) The Contractor shall have a qualified full time service staff with the ability to receive service request calls from elevator emergency phones and dispatch service technicians immediately upon receiving an emergency call or at the request of the Authorized User’s facility manager. A third party answering service and/or voice mail system is not acceptable.
 - vi) If after maintenance or service has been performed on a unit, that unit experiences a malfunction of equipment that should have been repaired during that maintenance or service

within 24 hours, the Contractor shall be obligated to provide, at no extra cost, a return visit by a trained elevator mechanic to correct the problem. The elevator mechanic shall respond to this callback within three hours regardless of what time the Authorized User's facility manager made the callback complaint, including after-hours times.

4. Maintenance of Elevator Phones

- i) The Contractor shall, upon request by the Authorized User, provide elevator phone services in Authorized User's owned or operated facilities. The service shall include monitoring, maintenance, repair, labor, and parts for elevator phones in those facilities.
- ii) Existing elevator phones in Authorized User's owned or operated buildings that are not ADA (Americans with Disabilities Act) compliant at the onset of this contract shall be replaced and monitored at the request of the Authorized User's facility manager. Phone replacement shall be considered out of scope as per Specifications 2.5. Any parts for this replacement are subject to the cost-plus term as stated in Terms and Conditions 7.3. Any labor costs shall be included in monthly maintenance costs unless after normal business hours.
- iii) All emergency phones shall be kept up to the standards set by the most recent ASME and all maintenance and testing shall be in accordance with the requirements and recommendations of the ASME and State regulations.
- iv) If repairs are required the Contractor shall notify the Authorized User within two (2) hours of identification. The repairs shall be completed by the Contractor within twenty-four (24) hours.
- v) Removal – All phones removed from elevators shall remain the property of the Authorized User.
- vi) Installation – Any parts used for elevator phone installation shall be approved by the Authorized User's facility manager prior to installation. Installation solely for modernization or cosmetic purposes shall be considered out of scope of the monthly maintenance as per Specifications 2.5. Any parts for this replacement are subject to the cost-plus term as stated in Terms and Conditions 7.3. Any labor costs shall be included in monthly maintenance costs unless after normal business hours.
- vii) All dedicated telephone lines, if required, will be provided by the Authorized User.
- viii) Monitoring – The Contractor shall provide, twenty-four (24) hours a day, seven (7) days a week, three-hundred sixty-five (365) days a year, a dispatch service, by local office number, and an E-service web address.
- ix) All hands-free phones shall be programmed to the Contractor's service.
- x) Location chips shall be programmed and tested monthly.
- xi) To ensure the Authorized User has sufficient information to contact the Contractor for service calls – both emergency and non-emergency – the Contractor shall, at contract implementation, submit to the Facility Administrators or authorized representatives, all relevant contact information for its service operations manager. The Contractor shall regularly ensure this information remains current.
- xii) Emergency Calls for Phone Repair Service – During the course of the contract no phone shall be out of service for more than twenty-four (24) hours without notification. Any time a phone is out of service on an otherwise functioning elevator, the Contractor will notify all necessary Authorized User's facility managers.

5. Scheduling

- i) Establishment of the monthly maintenance schedule shall be coordinated between the facility manager and the Contractor, based on the requirements needed by individual Authorized Users and as recommended in the Non-mandatory Appendix N Recommended Inspection and Test Intervals in “Months” Section in ASME A17.1-2010.
 - ii) All preventative maintenance shall be coordinated and scheduled in advance with the Authorized User’s facility manager.
 - iii) Removal of elevator equipment from service shall be coordinated with and approved by the Authorized User’s facility manager. To the extent possible all preventative maintenance which requires removal of elevator equipment from service shall be scheduled after Regular Work Hours in coordination with the Authorized User’s facility manager.
 - iv) The Contractor shall give a minimum of two (2) business days’ notice to the Authorized User before removing any elevator equipment from service for preventative maintenance. The Contractor shall not remove from service more than one elevator at a time in any bank of elevator equipment (except in emergencies.)
 - v) Non-emergency breakdowns and shutdowns such as electrical trouble, burned out control coils, open circuits, or electrical or mechanical adjustments should not keep the elevator equipment out of service longer than twenty-four (24) hours.
 - vi) Any shutdown or breakdown exceeding three (3) consecutive days is not acceptable. This includes locating the trouble, procurement of parts, installation of parts and placing of the equipment back into safe, uninterrupted operation. The Contractor must be equipped to meet these conditions. Inability to obtain parts or unavailability of necessary technical advice or engineering expertise is not acceptable. The Contractor shall submit within the first three (3) days, a reasonable expected return to service date, as agreed upon by both parties, for repairs and delays that are beyond the control of the Contractor.
 - vii) In the event that an elevator, escalator, wheelchair lift, etc. is deemed to be in such constant use that it cannot be removed from service for preventative maintenance operations during Regular Work Hours, the Contractor will provide all maintenance requiring shutdowns outside of Regular Work Hours, at no additional cost. The list of elevators requiring monthly maintenance outside of Regular Work Hours is subject to change at any time, and the Authorized User will provide updates to the Contractor.
6. Test and Inspection Procedures
- i) Periodic tests and inspections as required in ASME shall be documented and recorded by the Contractor and may be witnessed by the Authorized Users’ facility manager.
 - ii) The inspector shall submit a signed written report to the authority having jurisdiction containing:
 - (1) Date of inspection,
 - (2) Type of test(s) performed,
 - (3) Detailed results of the test(s) including, but not limited to, speed governor trip speed, safety slide distance, relief valve setting, escalator brake torque setting, etc.,
 - (4) Code deficiencies noted during the test,
 - (5) Statement as to any corrective action taken.
 - iii) Written reports of all tests and inspections shall be submitted to the Authorized User’s facility manager and, in the case of running safety tests, prior notification shall be given so that a designated representative of the Authorized User may be present. Monthly Inspection

Checklists shall be signed by both parties to confirm compliance with maintenance requirements under the contract.

- iv) The Contractor shall conduct all tests as required by the most recent ASME and the State regulations.
- v) The Contractor shall submit written results of all inspections and tests in accordance with the applicable code regulations. Immediately following all inspection and tests, copies of the reports shall be forwarded to the Authorized User's facility manager and any other persons or entities the Authorized User and its representative(s) deem necessary, which will be designated in writing.
- vi) A certificate of inspection authorizing the continued use of the elevator inspected shall be issued by the Contractor, bearing the date of inspection and the Contractor's name and address. This certificate shall be displayed or filed in accordance with the standard practices and procedures of the building/site containing the machine.
- vii) The Contractor shall commit the necessary resources to accomplish the performance of these requirements.

5) General Procedures

1. Contractor shall agree to attend meetings with the Authorized User's facility manager at minimum once each quarter and at the request of the Authorized User's facility manager for the purpose of delivering, reviewing, and discussing a monthly written summary of all callbacks for repairs, maintenance, scheduling, and other contract compliance issues. The intent and purpose of the meeting and summary are to minimize callbacks of the Contractor by keeping the Authorized User aware of performance trends, replacements, and other maintenance issues.
2. A trouble log shall be maintained by the Contractor in the machine room of each building on which the date of each callback, the reported trouble, the problem found, and the corrective action taken shall be recorded. In addition, the Contractor shall, be responsible for reporting this information daily to the Authorized User's facility manager so that he/she may also review the operational status of the building's elevator trouble log, reference Attachment C.
3. Contractor is only authorized for the work specified in the Purchase Order or written instruction from the Authorized User's facility manager. Unauthorized work performed by the Contractor shall be considered a violation of this contract.
4. The Contractor is responsible for bringing any maintenance issues found to the Authorized User Facility Manager's attention so that repairs can be properly authorized.
5. Contractor employees shall sign in and out using each building's log. The employee's and Authorized User facility manager's signature must be on the log for both signing in and out. A physical or digitized log may be used at the Authorized User's discretion.
6. Wiring Diagrams
 - i) If necessary to perform services under this Contract, the Contractor may have access to all applicable prints, schematics, wiring diagrams etc., presently on site. Depending on the nature of the information required, the Contractor may have to agree to keep such information confidential under the State's public record laws. These documents shall remain the property of the Authorized User and are to remain on the premises at all times. Contractor shall maintain the Authorized User's wiring changes or modifications to circuits resulting from control modifications, parts, replacements or equipment upgrades. The Authorized User shall retain sole possession of these drawings. The Contractor shall not make any copies of these

diagrams or take any pictures without express written permission from the Authorized User's facility manager.

- ii) The Contractor will sign a NDA prior to viewing the diagrams per Tenn. Code Ann. § 10-7-504.
- iii) Wiring diagrams shall be kept neatly protected and stored (except where mounted on boards) and shall be copied and replaced if their condition warrants. Wiring changes shall be marked up on the drawings. All drawings shall be considered property of the Authorized User.

7. Genuine Parts

- i) In performing the above indicated work, Contractor agrees to provide only genuine parts authorized by the manufacturer of the equipment for replacement or repair, and to use only those lubricants obtained from or recommended by the manufacturer of the equipment. Equivalent parts or lubricants may be used only if approved in writing by the Authorized User prior to their use. Parts requiring repair shall be rebuilt to "as new" condition.
- ii) All parts installed under the provisions of this contract shall be inventoried by the Contractor subject to periodic verification by the Authorized User and tracked by Contractor work order. Any consumable materials and supplies (grease, rags, etc.) required for monthly maintenance are to be provided by the Contractor at no additional cost to the Authorized User. The cost for any consumable materials should be included in the monthly maintenance fee and will not be inventoried by the Authorized User.
- iii) In the event that a part must be replaced, the Contractor will provide the old part to the Authorized User's facility manager after installation of the new part.

8. Tenn. Code Ann. § 4-3-1114

All elevators housed within state-owned public buildings have an emergency keyed lock box installed next to each bank of functioning elevators located on the main level. The Contractor shall not remove or tamper with this lock box without first receiving written permission from the Authorized User's facility manager. The Contractor shall notify the Authorized User's facility manager if there is any evidence of tampering.

6) Supplier and Employer Qualifications

1. Required Certifications and Licenses

- i) Contractor's employees providing service through the contract must have a Federal Department of Labor certificate.
- ii) Contractor employees providing service through the contract must have an International Union of Elevator Constructors (IUEC).
- iii) Contractor must be registered with the Tennessee Department of Labor and Workforce Development.
- iv) Contractor must provide proof that employees meet the specified requirements.

2. Employees of Contractor to be Satisfactory

All employees performing work under this contract shall be satisfactorily dressed in clean uniforms (identifying them as contract elevator service personnel) with acceptable demeanor and possessing full technical qualifications in the opinion of the Authorized User's facility manager.

3. Contractor to Comply

- i) Contractor employees will be denied access to the property if determined to be under the influence of a controlled substance and/or alcohol.

- ii) Employees shall not have in their possession firearms, explosives, controlled substances or other potentially harmful, dangerous or illegal items on Authorized User's properties.
- iii) Any employees found to be unacceptable to the Authorized User's facility manager shall be replaced by the Contractor after being given reasonable notice.

7) Authorized Users Facility Instructions

1. Repair and Patching to Authorized User 's Property

All damage to sidewalks, streets, alleys, curbs, lawns, plants, gutters or existing structures, etc. occurring in association with elevator construction or repair shall be restored by the Contractor at its expense. Repair of sidewalks shall be made by replacing the entire block damaged. Cracked sidewalks will be considered as damaged. The Contractor shall be held responsible for damage to the present work, or to completed new work, that may be caused by its work or work crew; and shall properly patch or remove and replace same at its expense.

2. High Security Facilities

Contractor servicing high security locations are required to have background checks of onsite employees, at the Contractor expense, give a forty eight (48) hour notice upon arrival, and must be escorted while on the premises.

3. Maintenance during Facility Renovations and/or Modernizations

The Authorized User, at its discretion, shall occasionally remove elevator equipment from this contract for renovations or modernizations. The Contractor shall maintain the elevator equipment until notified otherwise by the Authorized Users' facility manager. The Contractor shall resume monthly maintenance when requested by the Authorized User(s). Elevator equipment taken out of service for renovation or modernization by the Authorized User shall be excluded from the monthly preventive maintenance rate for the duration of the renovation/modernization contract.

4. Machine Rooms

- i) Parts cabinets are the property of the Authorized User and are in place or will be provided.
- ii) A metal can and lid shall also be provided in each machine room for the storage of clean rags. These cans are the property of the Authorized User and are in place. Oily/soiled rags shall be removed immediately after use by Contractor and shall not be left in the machine rooms.
- iii) Machine rooms shall be kept clean and neat when onsite by Contractor.

8) Attachments

The following attachments apply to the above specifications, may be used for all applicable service conducted, and may be changed at any time at the Authorized User's discretion:

- i) Attachment A. Monthly Maintenance Checklist
- ii) Attachment B. Sign-in Sheet example
- iii) Attachment C. Trouble Log example